

Manaos, Brazil. One male collected by Mann and Baker.

Type.—Cat. No. 14579, U. S. National Museum.

Ophrynopus batesianus Westwood.

Ophrynopus fulvistigmus Westwood.

Both from Porto Velho, Rio Madeira. (Mann & Baker.)

A PECULIAR NEW CRANE-FLY FROM PORTO RICO
(*TIPULIDÆ*; *DIPTERA*).¹

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In some large collections of Neotropical crane-flies received for study from various sources, a peculiar form was discovered which can scarcely be placed in any of the described genera and the following new group is proposed for its reception:

Megistomastix gen. nov.

Antennæ (See fig. 1) very long, almost twice the length of the body; first segment cylindrical, short, the basal two-thirds smooth, the apical third on the dorsal aspect, with a broad depression; second segment short, irregularly cyathiform, the proximal side produced much farther cephalad than the distal side; third segment very elongate, at the base about two-thirds the diameter of segment two, rapidly narrowing to a diameter equal to one half of segment two, thickly clothed with long delicate hairs; segments four to thirteen, gradually decreasing in length, bearing the delicate hairs throughout. Rostrum without a nasus. Palpi short, none of the segments conspicuously longer than the others. Vertex produced forward into a short protuberance. Thoracic pronotum not conspicuous from above, the scutellum represented by a very narrow transverse piece; mesonotum rather depressed, the præscutum sub-circular, about as broad as long. Halteres long, stem slender. Legs long, femora shorter than the tibia; tarsi very long, twice the length of the femora.

Venation: Sc rather long, Sc₂ entering R₃ just before the origin of R₅. R₁ rather long, ending opposite the fork of R₂₊₃. R₃, very short, transverse, shorter than the cross-vein *r-m*. R₂₊₃ rather long, about one-third the length of R₃. R₂ leaves R₂₊₃ at an angle of about 100°, its terminal section obliterated, represented by an indistinct spur at the junction of cross-vein *r*. Cross-vein *r-m*, long, longer than

¹ Contribution from the Entomological Laboratory of Cornell University.

the deflection of R_{4+5} . Cell 1st M_2 elongate, the sides parallel. M_{1+2} beyond the cross-vein m , short, about equal to the cross-vein $r-m$. Cu_1 meets M_3 at a point, barely obliterating the cross-vein $m-cu$. Cell Cu_1 broadest basally as in the Tipulinae, Cu_2 being gently situaed; 2d A rather short. Cells of the wings with sparse hairs, more numerous in the distal portion of the wing. Type and only known species, *M. portoricensis*, sp. nov.

This genus is referable to the tribe Dolichopezini. It agrees most closely with *Oropeza* and *Dolichopeza* but the antennae, hypopygium and details of venation are quite different from these genera. It agrees to some extent, in the shape of the antennae and the frontal tubercle, with *Macromastix* O. S., of Australasia and Chile; however it is only distantly related to this genus.

A Key to the Dolichopezini.

1. R_2 distinct for its entire length; antennae with less than 13 segments;
Male genitalia small, simple in structure.....2
 R_2 obliterated, at least on its terminal section; antennae with 13 segments; Male genitalia complex in structure.....4
2. Antennae long, filiform, or short; R_{2+3} perpendicular, simulating a cross vein; cross-vein $m-cu$ present.....**Megistocera** Wiedemann
(Asia, Africa and America; tropics)
 Antennae short; R_{2+3} not perpendicular; cross-vein $m-cu$ absent.....3
3. Head closely applied to the pronotum; 2d anal vein rather long
Tanypremna Osten Sacken¹
(Cent. and South America; tropics)
 Head on a neck-like prolongation of the thorax; 2d anal vein short, running into the anal angle of the wing.....**Brachypremna** Osten Sacken
(North and South America)
4. R_3 apparently lacking; if interpreted as being present, its basis much farther distad than its tip.....**Scamboneura** Osten Sacken
(East Indies)
 R_3 present, but often short and simulating a cross-vein.....5
5. Cell 1st M_2 absent; basal deflection of Cu_1 proximad of the fork of M.
Dolichopeza Curtis
(Eur.; N. Am.; Australia)
 Cell 1st M present; basal deflection of Cu_1 distad of the fork of M.....6
6. Antennae of male normal, short, with a few scattered hairs; cross-vein m tends to become obliterated; R_3 more elongate....**Oropeza** Needham
(Eastern U. S.)
 Antennae of male longer than the body, thickly clothed with long delicate hairs; cross-vein m prominent; R_3 short, transverse
Megistomastix, gen. nov.
(Greater Antilles)

¹ *Tanypremna omissinervis* de Meijere (New Guinea) would run down to section A_2 ; it undoubtedly represents a new genus. I have a ♀ from Milne Bay, New Guinea. *Tanypremna fastidiosa* Skuse (Australia) scarcely seems to be congeneric with the Neotropical forms; these species need further study.

Megistomastix portoricensis sp. nov.

Male. Antennæ elongate; color light brown; pleuræ paler; legs brown.

Length 5 mm.; wing 7.5 mm.; antennæ 9.5 mm.; fore leg, femur, 5 mm.; tibia, 6.5 mm.; tarsus, 10.6 mm.

Vertex produced cephalad into a triangular tubercle; on the sides, at the inner angle of the eye, a shallow depression. Antennæ light brown, the flagellar segments darker brown, the long flagellar hairs black. Vertex light brown, with a yellowish median line; front internally light gray, a narrow median brown line extending from the cephalic margin of the vertex forwards; front between the antennæ and inner margin of the eye, light brown; genæ and occiput brown. Rostrum and palpi light yellow, palpal segments three and four, darker brown.

Thorax: prothoracic scutellum light, whitish-yellow; mesonotal præscutum light brown, with indistinct spots of darker brown, the lateral and cephalic edge of the sclerite pale whitish-yellow; scutum, scutellum and postnotum uniform medium brown. Pleuræ light brown with an oblique pale stripe extending from near the mesothoracic spiracle to above the mesocoxa. Halteres pale, knob brown. Legs: coxa and trochanters light yellow; femora external face with a light yellow basal streak, rest of the femora and the tibia and tarsi dark brown.

Abdomen: targum, basal two segments light yellowish-brown; remainder dark brownish-black; hypopygium light yellow; sternum paler brown.

Wings: light grayish-brown; stigma large, square, occupying most of cell 1st R_1 and the distal end of cell C ; a brown furrow-like mark in under Cu . Venation (see generic characterization) as in fig. 2.

Genitalia: 6th and 7th sternites projecting, sheath-like, beyond the basis of the following segment; hypopygium not prominently exerted. Hypopygium (see fig. 3). Suture between sternite and tergite of the 9th segment not very distinct; sternal region (e) produced caudally into a lobe which is broadly and roundly emarginated on the ventral aspect, the whole of this projection being clothed with long hairs; tergal region narrow, deeply emarginate, the inner arm (a) bearing a caudad-projecting appendage (b); the ventral or outer arm (c) is more slender and bears three teeth on its inner margin; below this and nearer to the sternal margin is an appendage (d) which is pseudo-segmented; a large pale organ, brown at the tip, projects from the dorsal portion of the genital chamber. The figure is drawn from the unique type and is somewhat compressed under glass.

Holotype—Male, El Yunque, Porto Rico; 2800 ft.; Feb. 20, 1900. C. W. Richmond, collector. (Coll. U. S. Nat. Mus.; Access, No. 14,592).

It is barely possible that the *Megistocera brasiliensis* Wiedemann (Aussereuropäische Zweiflügeligen Insekten, I; p. 554; pl. VI b.; fig. 13, antenna; 14 wing.) is referable to this new genus. The species is stated by Osten Sacken to be nearly related to *Pachyrhina* Macquart (See Osten Sacken, Studies on Tipulidæ, p. 241; Berliner Ent. Zeitschr., XXXI; [1887]; Pt. 2).

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OBSERVATIONS ON *MICOUTALIS CALVA* SAY.

BY IGNAZ MATAUSCH,

Roselle, N. J., 1911.

Two years ago, on September 26, I found the first insect of this species, a female, near Irvington, N. J. Last year I did not see a single one, but this season, on August 20, while examining an elder bush near Roselle, N. J., for a larger genus (*Acutalis*), I found two very small insects like it, but of a considerably smaller size, which proved to be *Micoutalis*; one of these I captured, but the other escaped.

While hunting around that bush, where numerous ironweed-plants (*Vernonia noveboracensis*) had been in full bloom, I found one very small nymph belonging, as I saw, to a small kind of *Membracidae*. Soon afterward I found more of these nymphs, and at the same time more of the adult insects of *Micoutalis*. I thought they probably were the nymphs of that species, and to make sure I collected a number which I succeeded in rearing, as all (with the exception of one which died) were in the last nymphal stage. They matured, and both sexes have been obtained; on August 22d, the first, a male; on 23d a female; on 24th another female; on 26th more males and females. On this last day the plant wilted, and on the 28th all died.

On September 3, when the plants in the field began to wither, I collected two more nymphs which matured, one on September 11 and the other the following day, both females. On September 4 I found one soft nymph, of a brilliant yellow-red color, just after the change from the preceding stage into the last nymphal stage; but its bright color did not last, and after about one hour turned to a yellowish-red brown.

They seem to be very delicate, for after being handled in that